

REMARKS

Claims 9-21 are in the case and presented for reconsideration.

Claims 9 and 15 have been amended to include the limitation that the adhesive material consists essentially of an ethylene methyl acrylate copolymer or an ethylene normal butyl acrylate copolymer and at least one additional polymer. Support for this amendment is found on pages 3-6 of the specification.

Requirement for Restriction:

The Examiner has restricted the claimed invention into two groups:

Group I - claims 9-20 as being drawn to a method of making a carpet; and

Group II - claim 21 as being drawn to a method for recycling a carpet.

Applicants elect Group 1, claims 9-20, and respectfully traverse the restriction for the following reasons.

Although Applicants agree with the Examiner that the inventions of Group 1 and Group 2 are distinct, Applicants submit that it would not be serious burden on the examiner to examine claim 21 concurrently with claims 9-20. For example, examination of independent claims 9 and 15 and their respective dependent claims will include some of the same art that will be used in the examination of claim 21. In accordance with Section 803 of the MPEP, Applicants respectfully request the examiner to reconsider and withdraw the requirement for restriction. If the examiner maintains the restriction, the examiner is authorized to cancel claim 21 without prejudice pursuant to 37 CFR 1.141.

Rejections under 35 U.S.C. § 103

Claims 9, 10, 12, 13, 15, 16, 18 and 19 were rejected under 35 U.S.C. § 103 (a) as being obvious over Taft et al. (U.S. 3,849,353) in view of PCT 98/38376 or PCT 98/38375 and further in view of Ballard (U.S. 3,940,525). Applicant submits that the amendment to claims 9 and 15 overcomes this rejection.

Applicants presently claimed invention is a method of making a carpet utilizing an adhesive consisting essentially of an ethylene methyl acrylate copolymer or a ethylene normal

butyl acrylate copolymer and at least one distinct additional polymer selected from polyethylene, ethylene-propylene copolymers, elastomers, styrenic copolymers of butadiene, styrenic copolymers of acrylonitrile, styrenic copolymers of ethylene, metallocene based polyethylenes, polyester, ethylene acrylic acid copolymers, ethylene methyl acrylic acid copolymers, butyl acrylate copolymers, ionomers, polyamides, and maleic anhydrides. The carpet includes a primary backing with tufts of carpet fibers penetrating the bottom surface of the primary backing, a secondary backing material secured to the primary backing by the adhesive. In preparing the carpet, the adhesive is extruded so as to adhere the bottom surface of the primary backing with the top surface of the secondary backing, and then continuously fusing together, using a two roll nip, the upper surface of the secondary backing and the bottom surface of the tufted primary backing.

Applicant submits that Taft in view of PCT '375 or PCT '376 and further in view of Ballard does not teach or suggest the presently claimed invention.

Taft et al. discloses a hot melt adhesive that is useful as a backsizing for tufted carpets. The hot melt adhesive that is substantially free of wax consisting essentially of from about 5 to about 50 weight % of a copolymer of ethylene and vinyl acetate, and/or an alkyl acrylate; about 10 to 85 weight % of atactic polypropylene; and 10 to 50 weight % of vulcanized rubber. Taft et al. does not teach or suggest making a carpet composition utilizing an adhesive blend consisting essentially of ethylene methyl acrylate copolymer and a second polymer specified above, which does not include vulcanized rubber. Moreover, Applicants submit that PCT '375, PCT '376 and Ballard would not motivate one skilled in the art to modify Taft et al. to derive Applicants' present invention.

PCT '375 and PCT '376 disclose a carpet prepared by extrusion coating an adhesive composed of substantially linear ethylene polymers and homogeneously branched linear ethylene polymers onto the backside of carpets. The primary backing, adhesive and a non-woven scrim backing are pressed together between a nip roll and a chilled roll.

Ballard discloses a process for backsizing a tufted carpet. The primary backing is coated with an ethylene/vinyl ester copolymer based hot-melt adhesive, the adhesive coated primary backing is then contacted with a secondary backing and thereafter solidifying the adhesive. Ballard teaches that the improvement of his carpet composition is the use of a polymer film as

the secondary backing. The polymer used as the secondary backing is selected from polyethylene, polypropylene and ethylene/vinyl acetate copolymers having a vinyl acetate content of up to about 18 weight %. The hot melt adhesives of Ballard are non-aqueous, solvent free and generally have about 10-90% by weight of an ethylene/vinyl acetate copolymer containing about 15-40% by weight vinyl acetate, about 10-90% by weight wax, preferably a petroleum derived or synthetic wax, and up to about 80% by weight of a thermoplastic resin such as rosin, rosin derivatives, coumarone-indene resins, terpene resins, terpene-phenolic resins, permanently fusible phenolic resins, and petroleum hydrocarbon resins.

Applicants submit that the combination of references does not teach or suggest a method of making a carpet composed of a primary backing, a secondary backing and an adhesive consisting essentially of ethylene methyl acrylate copolymer or a ethylene normal butyl acrylate copolymer and a second distinct polymer as specified.

Accordingly, Applicants submit that claims 9, 10, 12, 13, 15, 16, 18 and 19 are distinguishable over Taft et al. in view of PCT 98/38376 or PCT 98/38375 and further in view of Ballard and request that the 35 U.S.C. § 103(a) rejection be withdrawn.

Claims 11, 14, 17, and 20 were rejected under 35 U.S.C. § 103 (a) as being obvious over Taft et al. in view of PCT 98/38376 or PCT 98/38375 and in view of Ballard as above and further in view of Kerr (U.S. 6,428,873). Applicant submits that the amendment to claims 9 and 15 overcomes this rejection.

Kerr discloses launderable rubber backed floor mats of the type which have a pile surface on one side and a rubber or rubber-like material on the other side. Kerr further discloses a continuous process for making the rubber backed floor mats. Kerr teaches heating the primary fabric to a temperature between 220°F to 260°F and then depositing a layer of adhesive across the surface. The adhesive is an olefin based adhesive, such as a thermoplastic adhesive resin based on polyethylene, thermoplastic adhesive resins based on polypropylene, and a modified ethylene-vinyl acetate co-polymer resin. Applicants agree with the examiner that Kerr teaches the use of a rubber covered nip roll under a predetermined pressure for joining the various layers of the mat together. Kerr teaches that using a soft roller having a Shore A hardness of between about 40 and about 80 permits the nip roll to deform around the higher profile tufted areas of the

mat material, thereby tending to equalize the pressure distribution as the composite is passed through the nip between the rolls.

However, as discussed above, the combination of Taft et al. in view of PCT 98/38376 or PCT 98/38375 and further in view of Ballard does not teach or suggest a method of making a carpet composed of a primary backing, a secondary backing and an adhesive consisting essentially of ethylene methyl acrylate copolymer or a ethylene normal butyl acrylate copolymer and a second distinct polymer as specified. Applicants submit that Kerr does not motivate one skilled in the art to modify Taft et al., PCT '376, PCT '375 or Ballard, alone or in any combination to derive Applicants' presently claimed invention. The adhesives utilized in Kerr are those typically used in carpet construction and commercially available from other sources, see column 3, lines 13-29.

Accordingly, Applicants submit that claims 11, 14, 17, and 20 are distinguishable over Taft et al. in view of PCT 98/38376 or PCT 98/38375 and in view of Ballard and further in view of Kerr and request that the 35 U.S.C. § 103(a) rejection be withdrawn.

Applicants respectfully submit that claims 9-21 are now in condition for allowance and request the examiner to withdraw the earlier rejection and pass the application to allowance at the examiner's earliest convenience.

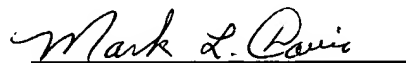
Version of Claims With Markings To Show Changes Made

9. (Amended) A method of making a carpet, the carpet comprising a tufted primary backing with a primary backing and tufts of carpet fibers penetrating a bottom surface of the primary backing and protruding from a top surface of the primary backing; a secondary backing material; and an adhesive material binding an upper surface of the secondary backing material to the bottom surface of the tufted primary backing; the carpet fibers, primary backing material and secondary backing material being selected from the group consisting of polypropylene, polyester, acrylics, polyethylene, polyamide, nylon, wool, cotton, rayon and combinations thereof and the adhesive material [comprising] consisting essentially of an ethylene methyl acrylate copolymer or ethylene normal butyl acrylate copolymer and at least one distinct polymer selected from the group consisting of low density polyethylenes, linear low density polyethylenes, high density polyethylenes, ultra low density polyethylene, ethylene-propylene copolymers, elastomers, styrenic copolymers of butadiene, styrenic copolymers of acrylonitrile, styrenic copolymers of ethylene, metallocene based polyethylenes, polyester, ethylene acrylic acid copolymers, ethylene methyl acrylic acid copolymers, butyl acrylate copolymers, ionomers, polyamides, and maleic anhydrides [an amorphous polyethylene copolymer selected from the group consisting of ethylene methyl acrylate and ethylene normal butyl acrylate]; the method comprising the steps of:
- a) extruding a heated sheet of the adhesive material; and
 - b) continuously fusing together in a two roll nip the upper surface of the secondary backing and the bottom surface of the tufted primary backing with the heated sheet.
15. (Amended) A method of using at least one of ethylene methyl acrylate copolymer and ethylene normal butyl acrylate copolymer to manufacture a carpet, the carpet comprising a tufted primary backing with a primary backing and tufts of carpet fibers penetrating a bottom surface of the primary backing and protruding from a top surface of the primary backing; a secondary backing material; and an adhesive material binding an upper surface of the secondary backing material to the bottom surface of the tufted primary backing; the carpet fibers, primary backing material and secondary backing material being selected from the group consisting of polypropylene, polyester, acrylics, polyethylene, polyamide,

nylon, wool, cotton, rayon and combinations thereof and the adhesive material [comprising] consisting essentially of an ethylene methyl acrylate copolymer or ethylene normal butyl acrylate copolymer and at least one distinct polymer selected from the group consisting of low density polyethylenes, linear low density polyethylenes, high density polyethylenes, ultra low density polyethylene, ethylene-propylene copolymers, elastomers, styrenic copolymers of butadiene, styrenic copolymers of acrylonitrile, styrenic copolymers of ethylene, metallocene based polyethylenes, polyester, ethylene acrylic acid copolymers, ethylene methyl acrylic acid copolymers, butyl acrylate copolymers, ionomers, polyamides, and maleic anhydrides [an amorphous polyethylene copolymer selected from the group consisting of ethylene methyl acrylate and ethylene normal butyl acrylate]; the method comprising the steps of:

- a) extruding a heated sheet of the adhesive material; and
- b) continuously fusing together in a two roll nip the upper surface of the secondary backing and the bottom surface of the tufted primary backing with the heated sheet.

Respectfully submitted,



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